

Questionnaire

1. Please type in your code _____
2. Your gender:
 - a. Female
 - b. Male
3. What subject is your extended essay related to? _____
4. In your opinion, do you think Climate Change is a threat?
 - a. Yes
 - b. No
 - c. Don't know
5. In your opinion, do you think humans cause Climate Change?
 - a. Yes
 - b. No
 - c. Don't know
6. In your opinion, do you think Climate Change is happening now?
 - a. Yes
 - b. No
 - c. Don't know
7. In your opinion, assuming Climate Change is happening, who do you think should be responsible for addressing Climate Change issues and problems?
 - a. Individuals and local communities
 - b. National and international regulations/governments
 - c. Both a and b
 - d. It's irrelevant, as Climate Change is not happening.
8. Climate Change is a concern for humans because of
 - a. Rising sea levels and increasing atmospheric temperatures
 - b. Rising sea levels and acidification of the ocean
 - c. Increasing atmospheric temperatures and acidification of the ocean
 - d. Rising sea levels, increasing atmospheric temperatures and acidification of the ocean
9. Fossil fuels include
 - a. Oil, Coal and Biogas
 - b. Oil, Coal and Rice-Paddy Methane
 - c. Oil, Coal and Natural Gas
 - d. Oil, Coal and petrified wood
10. Fossil fuels are
 - a. Finite Resources
 - b. Infinite Resources
 - c. Renewable Resources
 - d. Atmospheric Resources

11. What is the most abundant Greenhouse Gas?
 - a. Carbon dioxide
 - b. Methane
 - c. Per- and Hydro-fluorocarbons
 - d. H₂O

12. When we say 'anthropogenic climate change' we mean
 - a. Caused by humans
 - b. Affecting humans
 - c. Caused by solar radiation
 - d. Affecting solar radiation

13. What nation currently is the world's largest emitter of CO₂ (carbon dioxide)?
 - a. Qatar
 - b. USA
 - c. India
 - d. China

14. What nation currently has the highest per capita CO₂ (carbon dioxide) emissions?
 - a. Qatar
 - b. USA
 - c. India
 - d. China

15. What is the global climate agreement that sets mandatory emission targets called?
 - a. The Copenhagen Accord
 - b. The Kyoto Protocol
 - c. The IPCC Climate Change Agreement
 - d. The Cancun Accord Agreement

16. This global climate agreement is
 - a. A 2010 comprehensive and legally-binding agreement to combat climate change signed by all nations
 - b. A 2010 comprehensive and legally-binding agreement to combat climate change with support from most nations – except two
 - c. A 1997 treaty aimed at creating a basis for subsequent international agreements to combat climate change signed by all nations
 - d. A 1997 treaty aimed at creating a basis for subsequent international agreements to combat climate change with support from most nations – except two

17. The atmosphere is divided into different layers. The layer where most of the heat is retained is called
 - a. the exosphere
 - b. thermosphere
 - c. the troposphere
 - d. the stratosphere

18. The atmospheric layer where most of our atmosphere is retained contains
 - a. less than 6% of our atmosphere
 - b. approximately 75% of our atmosphere
 - c. approximately 92% of our atmosphere
 - d. none of the above – our atmosphere is evenly distributed through all layers

19. Climate Change is
- a naturally-occurring process
 - a human-made problem
 - both a and b
 - none of the above
20. Greenhouse Gases include
- methane, carbon dioxide, gaseous H₂O
 - carbon dioxide, methane, nitrogen
 - nitrogen, oxygen, ozone
 - gaseous H₂O, carbon dioxide, nitrogen
21. These gases are called Greenhouse Gases because
- they directly increase plant growth and increase photosynthesis
 - they change the atmospheric balance which directly decreases plant growth and increases desertification
 - they absorb incoming solar radiation (light) and this excites the atoms and this energy is released as heat into the atmosphere
 - they absorb infrared radiation and this excites the atoms and this energy is released as heat into the atmosphere.
22. The amount of Greenhouse Gases in our atmosphere compared to non-Greenhouse Gases is
- more than 92%
 - less than 6%
 - approximately 45%
 - approximately 75%
23. Without Greenhouse Gases in our atmosphere, our planet would be
- the same as it was before humans started changing it
 - approximately 2°C colder than it is today
 - approximately 5-10°C degrees colder than it is today
 - approximately 30°C colder than it is today
24. The GMST is
- The Global Methodology of Scientific Terms – an internationally agreed standard for climate science and units.
 - The Global Ministry on Science and Technology – a consortium of scientists investigating climate change.
 - The Governmental Ministry of Sceptics and Theologians – a consortium of sceptics investigating climate change science.
 - The Global Mean Surface Temperature – a measure of the Earth's global temperature over more than 50 years.
25. A positive feedback system is
- an input into a system which helps to reduce or oppose any changes and maintains stability
 - an input into a system which exaggerates and enhances change - leading to instability
 - an input into a system which causes the system to collapse
 - an input into a system which negates any further changes
26. A negative feedback system is
- an input into a system which helps to reduce or oppose any changes and maintains stability
 - an input into a system which exaggerates and enhances change - leading to instability
 - an input into a system which causes the system to collapse
 - an input into a system which negates any further changes

27. Impacts from Climate Change include
- none that can be accurately attributed to Climate Change
 - sea level rise, reforestation, improvement of urban environments
 - sea level rise, atmospheric warming, increase in hurricanes
 - sea level rise, increase in human population, increase in hurricanes
28. Anticipated global atmospheric warming is anticipated to increase by 2100 by _____
- There will be no perceptible warming
 - More than 10°C
 - More than 2°C
 - Less than 1°C
29. Sea-level rise is rising and is expected to be more than _____ by 2100.
- 10 metres
 - 1.0 metre
 - 0.1 metre
 - 0.01 metre
30. Global atmospheric warming is expected to be
- Uniform across the globe
 - Greater at the equator with less increase in polar and sub-polar regions
 - Greater at polar and sub-polar regions and with less increase at the equator
 - No perceptible change
31. Albedo is
- An effect created by snow and ice that reflects incoming solar radiation back to space and decreases atmospheric temperatures
 - An effect created by snow and ice that increase atmospheric temperatures by reflection to the atmosphere
 - An effect created by the ocean that absorb warmer temperatures and decrease atmospheric temperatures
 - An effect created by the ocean that emit warmer temperatures and increase atmospheric temperatures
32. Global dimming is
- A theory from the late 1960s which has since proven invalid
 - A valid counter-argument undermining climate change theory
 - A conspiracy undermining climate change theory
 - Effects that reduce warming in the atmosphere and acknowledged by climate scientists
33. Effects that reduce warming in the atmosphere that make a significant difference in the long-term average global temperature are
- Cosmic rays, volcanoes, clouds, sunspots
 - Volcanoes, clouds, reforestation, cosmic rays
 - Snow and ice, volcanoes, clouds, reforestation
 - Sunspots, snow and ice, cosmic rays, reforestation
34. Evidence of Climate Change is
- Poor
 - Fairly good – although there is a lack of real evidence and the research and data is inaccurate or incomplete
 - Good to excellent – the uncertainties rest on the magnitude of the change and where it will be most apparent not on the accuracy or abundance of the data
 - There is no uncertainty in climate science

35. The consensus among scientists* that Climate Change is happening is:
(*actively engaged in the field of climate science)
- a. 97% agree
 - b. 97% disagree or don't know
 - c. 64% agree, 36% disagree, 10% don't know
 - d. 36% agree, 64 disagree, 10% don't know
36. Please add additional comments or questions in relation to your knowledge or understanding of climate Change science: